

IN THE CLAIMS

Please amend the claims as follows:

1. (Currently Amended) An information retrieval system in which a set of distinct information items map to respective nodes in a self-organizing map by mutual similarity of the information items, so that similar information items map to nodes at similar positions in the self-organizing map, wherein the self-organizing map is ~~created by extracting features from trained upon reduced dimension characterizations of the information items and comparing, collectively, all of the features extracted from the information items~~, the system comprising:

a user control for defining a search criterion for selecting information items using a standard keyword search technique;

a detector for detecting those positions within the self-organizing map corresponding to the selected information items selected by the standard keyword search technique;

a graphical user interface for displaying display points representing those positions within the self-organizing map corresponding to the selected information items; and

a processor, responsive to the selected information items defined by the search criterion, for providing one or more representations representative of the information content of the selected information items,

wherein the information items include at least image data; and

wherein the processor is responsive to the selected information items and displays one or more images obtained from the image data included in the selected information items defined by the search criterion so as to indicate represent the subject matter content of the selected information items.

2. (Original) A system according to claim 1, wherein the graphical user interface is operable to display a two-dimensional display array of the said display points.

3. (Previously Presented) A system according to claim 2, in which a dither component is applied to the mapping between information items and nodes in the self-organizing map so that information items that share a node tend to map to closely spaced, but different positions in the displayed array.

4. (Previously Presented) A system according to claim 2, in which the information items are mapped to nodes in the self-organizing map on the basis of a feature vector derived from each information item.

5. (Original) A system according to claim 4, in which the feature vector for an information item represents a set of frequencies of occurrence, within that information item, of each of a group of information features.

6. (Original) A system according to claim 5, in which the information items comprise textual information, the feature vector for an information item represents a set of frequencies of occurrence, within that information item, of each of a group of words.

7. (Original) A system according to claim 1, in which the information items comprise textual information, the nodes being mapped by mutual similarity of at least a part of the textual information.

8. (Original) A system according to claim 6, in which the information items are pre-processed for mapping by excluding words occurring with more than a threshold frequency amongst the set of information items.

9. (Original) A system according to claim 6, in which the information items are pre-processed for mapping by excluding words occurring with less than a threshold frequency amongst the set of information items.

10. (Original) A system according to claim 1, wherein the said user control comprises:

search means for carrying out a search of the information items;
the search means and the graphical user interface being arranged to co-operate so that only those display points corresponding to information items selected by the search are displayed on the user display.

11. (Original) A system according to claim 1, wherein the said processor is operable to detect clusters of similar information items and to provide representations representative of the information content of the respective clusters.

12. (Original) A system according to claim 1, wherein the processor is operable to provide the or each said representation on the user display as a label of the display points corresponding to the information items represented thereby.

13. (Original) A system according to claim 12, wherein the label is a word or set of words.

14. (Original) A system according to claim 11, wherein the processor determines, in respect of a set of information items with which a label is to be associated, the most frequently used word or set of words in the information items corresponding to the selected information items and applies that word or that set of words as the label.

15. (Canceled).

16. (Previously Presented) A system according to claim 1, wherein the said processor is operable to select, from the set of image items, an image item which is representative of the set of image items as a whole according to a predetermined selection criterion.

17. (Previously Presented) A system according to claim 1, wherein the processor is operable to select the image item a property of which is nearest to the average of the same property of the said set of image items.

18. (Previously Presented) A system according to claim 1, wherein the said one or more representative image items are applied as labels to the display points corresponding to the information items represented thereby.

19. (Original) A portable data processing device comprising a system according to claim 1.

20. (Original) Video acquisition and/or processing apparatus comprising a system according to claim 1.

21. (Currently Amended) An information retrieval method in which a set of distinct information items map to respective nodes in a self-organizing map by mutual similarity of the information items, so that similar information items map to nodes at similar positions in the self-organizing map, wherein the self-organizing map is ~~created by extracting features from trained upon reduced dimension characterizations of the information items and comparing, collectively, all of the features extracted from the information items~~, the method comprising:

defining a search criterion for selecting information items using a standard keyword search technique;

detecting those positions within the self-organizing map corresponding to the ~~selected~~ information items selected by the standard keyword search technique;

displaying at least display points which are at positions representing those positions within the self-organizing map corresponding to the selected information items; and

in response to the selected information items defined by the search criterion, providing one or more representations representative of the information content of the selected information items,

wherein the information items include at least image data; and

wherein the providing step includes displaying one or more images obtained from the image data included in the selected information items defined by the search criterion so as to ~~indicate represent the subject matter content~~ of the selected information items.

22. (Original) A method according to claim 21, wherein the displaying step displays a two-dimensional display array of the said display points.

23. (Original) A method according to claim 21, comprising:
carrying out a search of the information items;
displaying on the display that only those display points corresponding to information items selected by the search are displayed on the user display.

24. (Original) A method according to claim 21, comprising detecting clusters of similar information items and providing representations representative of the information content of the respective clusters.

25. (Original) A method according to claim 21, comprising providing the or each said representation on the user display as a label of the display points corresponding to the information items represented thereby.

26. (Original) A method according to claim 25, wherein the label is a word or set of words.

27. (Original) A method according to claim 21, in which the information items are at least associated with image items, and
comprising providing one or more image items representative of the information content of the selected information items defined by the search criterion.

28. (Original) A method according to claim 27, comprising selecting, from the set of image items, an image item which is representative of the set of image items as a whole according to a predetermined selection criterion.

29. (Original) A method according to claim 28, comprising selecting the image item a property of which is nearest to the average of the same property of the said set of image items.

30-31. (Canceled)

32. (Currently Amended) A computer-readable medium ~~according to claim 31, the medium being a storage medium~~ storing a program which, when executed by a computer, causes the computer to perform the method recited in claim 21.

33. (Canceled)

34. (Currently Amended) A computer-readable medium storing a program that, when executed by a computer, causes the computer to generate a user interface of an information retrieval system in which a set of distinct information items map to respective nodes a self-organizing map by mutual similarity of the information items, so that similar information items map to nodes at similar positions in the self-organizing map, wherein the self-organizing map is ~~created by extracting features from trained upon reduced dimension characterizations of the information items and comparing, collectively, all of the features extracted from the information items~~, the interface comprising:

a user control for defining a search criterion for selecting information items using a standard keyword search technique; and

a graphical user interface configured to display points representing those positions within the self-organizing map corresponding to the selected information items selected by the standard keyword search technique and to display one or more representations representative of the information content of the information items selected by the search criterion,

wherein the information items at least include image data; and

wherein the graphical user interface is configured to display one or more images obtained from the image data included in the selected information items defined by the search criterion so as to indicate represent the subject matter content of the selected information items.

35. (Original) A user interface according to claim 34, wherein the said user control comprises:

search means for carrying out a search of the information items;
the search means and the graphical user interface being arranged to co-operate so that only those display points corresponding to information items selected by the search are displayed on the user display.

36. (Original) An interface according to claim 34, wherein the graphical user interface is arranged to display representations representative of the information content of respective clusters of similar information items.

37. (Original) An interface according to claim 34, wherein graphical user interface is operable to provide the or each said representation as a label of the display points corresponding to the information items represented thereby.

38. (Original) An interface according to claim 37, wherein the label is a word or set of words.

39. (Original) An interface according to claim 34, wherein the said representations are image items which are applied as labels to the display points corresponding to the information items represented thereby.